

UPDATED PUBLICATIONS FOR INTEX-A/ICARTT JGR SPECIAL SECTION (1/09/2006)

- Al-Saadi, J., R. B. Pierce, C. Kittaka, D. Fairlie, T. K. Schaack, D. R. Johnson, T. H. Zapotocny, M. Avery, A. Thompson, R. Cohen, J. Dibb, J. Crawford, D. Rault, J. Szykman, R. Martin, **Lagrangian Characterization of the Sources and Chemical Transformation of Air Influencing the Continental US During the 2004 ICARTT/INTEX-A Campaign**
- Avey, L., T. Garrett, A. Stohl, J. Holloway, **Analyses of cloud properties in pollution plumes off the Northeast U.S.**
- Bertram, T.H., A. Perring, P. Wooldridge, R. Cohen, J. Dibb, E. Scheuer, J. Crounse, P. Wennberg, S. Vay, S.Kim, G. Huey, J. Walega, A. Fried, M. Porter, H. Fuelberg, B. Heikes, G. Sachse, M. Avery and A. Clarke, **Convection and the Age of Air in the Upper Troposphere**
- Browell, E. V., M. A. Fenn, J. W. Hair, C. F. Butler, A. Notari, S. A. Kooi, S. Ismail, M. A. Avery, R. B. Pierce, and H. E. Fuelberg, **Large-scale Air Mass Characteristics Observed During the Summer Over North America and Western Atlantic Ocean**
- Brune, W. H., X. Ren, J. Mao, R. Lesher, R. Long; J. Crawford, G. Chen, J. Olson, R. Cohen, B. Heike, H. B. Singh, A. Fred and some others, **HOx Chemistry and Ozone Production in the Different Plumes Encountered During INTEX-A**
- Büker, M. Hitchman, Pierce, Browell, Kis, Tripoli, **Convective Initiation of Long-range Stratopheric Influence during INTEX-NA: local ozone flux values**
- Büker, M. Hitchman, Pierce, Browell, Zachar, Tripoli **Sensitivity of Ozone Flux values to tropospheric assimilation during INTEX-NA**
- Cambell, E., S. Vey, C. Stanier, G. Carmichael, Y. Tang + many, **Analysis of anthropogenic CO2 signal in ICARTT observations using a regional model and its adjoint**
- Carmichael, G., Y. Tang, M. Mena + many, **Regional-scale chemical transport modeling in support of the analysis of observations obtained during the ICARTT experiment**
- Chai, T., G. Carmichael, Y. Tang, A. Sandu, D. Streets + many, **Evaluating and improving regional emission estimates using the ICARTT observations**
- Clarke, A. D., V. Kapustin, S. G. Howell1, C. S. McNaughton1, Y. Shinozuka, B. Anderson, Jack Dibb, **Aerosol from biomass burning and regional pollution over North America during INTEX-NA: Humidity response and the wavelength dependence of scattering and absorption**
- Chen, M., R. Talbot, H. Mao, B. Sive, **Trace gas measurement and air mass classification over New England coastal region**
- Cooper, O. R., A. Stohl, M. Trainer, A. Thompson, J. C. Witte, S. J. Oltmans, B. J. Johnson, J. Merrill, J. L. Moody, G. Morris, D. Tarasick, G. Forbes, P. Nédélec, F. C. Fehsenfeld, J. Meagher, M. J. Newchurch, F. J. Schmidlin, Solène Turquety, J. H. Crawford, K. E. Pickering, S. L. Baughcum, W. H. Brune and C. C. Brown, **Large upper tropospheric ozone enhancements above mid-latitude North America during summer: In situ evidence from the IONS and MOZAIC ozone monitoring network**
- Crawford, J., J. Olson, G. Chen, W. Brune, A. Fried, B. Heikes, L. G. Huey, M. Avery, G. Sachse, G. Diskin, R. Cohen, H. Singh, + many others, **Summertime ozone production over North America during INTEX-A based on observed and modelled photochemistry**
- Crounse, J., P. Wennberg, Kwan, B. Heikes, O'Sullivan, Shen, Crawford **Peroxyacetic acid is ubiquitous in the upper troposphere**
- Dibb, J., E. Scheuer, R. Talbot, M. Avery and others whose data prove key to the story, **Stratospheric Influence on the Composition of the Mid- and Upper-Troposphere over North America Sampled by the NASA DC-8 during INTEX A**
- Emmons, L., D.P. Edwards, J.C. Gille, G. Sachse, S. Wofsy, P. Nedelec, V. Thouret, J-L. Attie [et al.], **MOPITT Validation Update for Summer 2004**

- Fiore, A., L. W. Horowitz, and many others where we use their data, **Observational constraints on isoprene nitrate chemistry over the eastern United States**
- Fried, A., J. Walega, J. Olson, J. Crawford, G. Chen, B. Heikes, D. O' Sullivan, H. Shen, and many others where we use their data, **The Role of Convection in Redistributing Formaldehyde to the Upper Troposphere over North America and the North Atlantic during the Summer 2004 INTEX Campaign**
- Fuelberg, H. E., M. Porter, C.M. Kiley, D. Morse, **A meteorological overview of the INTEX-A period**
- Garrett, T. J., L. Avey, P. Palmer, C. Brock, T. Ryerson, A. Neuman, J. Holloway, **Observational Quantification of Precipitation Scavenging of Anthropogenic HNO₃ and CCN during ICARTT**
- Heckel, A., A. Richter, F. Wittrock, J. P. Burrows, T. Bertram, R. Cohen, A. Perring, P.J. Woolridge, A. Fried, B. Heikes, H. Shen, D. O'Sullivan, and J. Snow, **Validation of SCIAMACHY tropospheric NO₂ and HCHO columns during INTEX-A/ICARTT"**
- Hennigan, C., S. Sandholm, S. Kim, R. Stickel, G. Huey, R. Weber, **Influence of Ohio River Valley Emissions on Fine Particle Sulfate Measured From Aircraft Over Large Regions of the Eastern U.S. and Canada During INTEX-NA**
- Howell, S., A. D. Clarke, C. McNaughton, R. Kahn, P. Russell, J. Livingston, J. Redemann, B. Schmid, P. Quinn, E. Browell, B. Anderson, **On the significance of small scale aerosol features to quantitative assessment of satellite validation and closure studies: MISR validations during ICARTT/INTEX**
- Hudman R.C., D.J. Jacob, S. Turquety, L.T. Murray, S. Wu, M. Avery, T.H. Bertram, E. Browell, W. Brune, R.C. Cohen, J.E. Dibb, F.M. Flocke, A. Gilliland, J. Holloway, A. Newman, X. Ren, T.B. Ryerson, G.W. Sachse, H.B. Singh, P.J. Wooldridge, **A multi-platform analysis of the North American reactive nitrogen budget during the ICARTT summer intensive**
- Hudman, R.C., L.T. Murray, D. J. Jacob, S. Turquety, S. Wu, M. Avery, E. Browell, A. Gilliland, J. Holloway, G.W. Sachse **Characterization of the North American Ozone-CO correlations during the ICARTT Study**
- Kahn, R., A. Clarke, S. Howell, J. Livingston, C. McNaughton, P. Quinn, J. Redemann, P. Russell, B. Schmid, M. Bull, D. Nelson, **Aerosol Properties from MISR Space-based Multi-angle Imaging: INTEX-NA Campaign Validation and Results**
- Kiley, C. M., and H. E. Fuelberg, **An examination of summertime cyclone transport processes compared to classical warm conveyor belts defined during the cool season**
- Kiley, C. M., H. E. Fuelberg, L. Emmons, G.R. Carmichael, Y. Tang, **A comprehensive investigation of warm season CO lofting and transport episodes utilizing in situ measurements, a regional scale chemical transport model, and satellite-derived data**
- Kim, S., L.G. Huey, R.E. Stickel, D.J. Tanner, J. Crawford, J. Olson, G. Chen, W. Brune, X. Ren, R. Lesher, R. Cohen, T. Bertram, A. Perring, P. Wooldridge, B. Lefer, and R. Shetter, **Measurement of HO₂NO₂ in the Upper Troposphere during INTEX-A**
- Kittakai, C. B. Pierce, J. Szykman, J. Al-Saadi, T. Schaack, G. Tripoli, A. Chu, M. Avery, D. Fairlie and E. Browell, **An aerosol model study with MODIS AOD assimilation: Assessing impacts of Alaskan smoke on the continental US air quality during ICARTT/INTEX-NA.**
- Kondragunta, S., A. Prados, P. Ciren, I. Laszlo, C. Kittaka, B. Pierce, **Characterizing GOES Aerosol Optical Depth (AOD) retrievals during INTEX-A**
- Lambert, T. D., C. P. Wake, R. S. Woodward, T. Kelly, J. C. Salloway, **Acute health effects of O₃, particulate matter, aeroallergens, and climateon pulmonary function, and respiratory symptoms in a mixed cohort of participants in the Northeast U.S. and New Brunswick during summer 2004**
- Liang, Q., L. Jaeglé, R. Hudman, S. Turquety, D. Jacob, M. Avery, G. Sachse, D. Blake, E. Browell, W. Brune, X. Ren, R. Cohen, J. Dibb, G. Huey, H. B. Singh, P. Wennberg, L. Pfister, H.

Fuelberg, Summertime influence of Asian pollution in the middle and upper troposphere during INTEX-A

Livingston, J., B. Schmid, J. Redemann, P. Russell, S. Ramirez, J. Eilers, W. Gore, S. Howard, J. Pommier, T. Bates, P. Quinn, D. A. Chu, Bo-Cai Gao, E. Fetzer, W. McMillan, S. Wetzel Seeman, and E. Borbas, **Comparison of Sunphotometer and Near-Coincident in Situ and Remotely Sensed Water Vapor Measurements during INTEX-A/ICARTT**

McNaughton, C. S., A. D. Clarke, S. G. Howell, M. Pinkerton, B. Anderson, L. Thornhill, E. Winstead, C. Hudgins, J. E. Dibb, E. Scheuer, H. Maring, **Results from the DC-8 inlet characterization experiment (DICE): Airborne versus surface sampling of mineral dust and sea salt aerosols**

Martin, R. V., C. E. Sioris, K. Chance, T. B. Ryerson, T. H. Bertram, P. J. Wooldridge, R. C. Cohen, J. A. Neuman, A. Swanson, F. M. Flocke, **Evaluation of space-based constraints on nitrogen oxide emissions with regional aircraft measurements over and downwind of eastern North America**

Millet, D. B., D. J. Jacob, S. Turquety, R. C. Hudman, S. Wu, A. Fried, J. Walega, B. G. Heikes, D. R. Blake, H. B. Singh, B. E. Anderson, A. D. Clarke, **Formaldehyde distribution over North America: Implications for satellite retrievals of formaldehyde columns and isoprene emission**

Morris, G. A., S. Hersey, A. M. Thompson, O. R. Cooper, S. Pawson, E. Nielsen, P. R. Colarco, W. W. McMillan, A. Stohl, S. Turquety, J. Warner, B. J. Johnson, T. L. Kucsera, D. E. Larko, S. J. Oltmans, and J. C. Witte, **Alaskan and Canadian forest fires exacerbate ozone pollution over Houston, Texas, on 19 and 20 July 2004**

Pierce, R. B., J. Al-Saadi, C. Kittaka, D. Fairlie, T. K. Schaack, D. R. Johnson, T. H. Zapotocny, M. Aevery, A. Thompson, R. Cohen, J. Dibb, J. Crawford, D. Rault, Jim Szykman, Randall Martin, **Chemical data assimilation based estimates of Continental US Ozone and Nitrogen budgets during INTEX-A.**

Porter, M., H. Fuelberg, K. Pickering, J. Crawford, W. Brune, R. Cohen, B. Heikes, G. Sachse, H. B. Singh, P. Wennberg, **Assesing convective influence by utilizing cloud to ground lightning data and high resolution kinematic trajectories**

Riddle, E., E., P. B. Voss, A. Stohl, D. Holcomb, D. Mazcka, K. Washburn, R. W. Talbot, **Trajectory model validation using constant altitude CMET balloons during ICARTT-2004**

Russell, P. B., J. Livingston, J. Redemann, B. Schmid, S. Ramirez, J. Eilers, P. Pilewskie, A. Chu, R. Kahn, P. Quinn, A. Clarke, S. Howell, C. McNaughton, R. Ferrare, E. Browell, **Use of a Variety of Aerosols Transported off the US Northeast Coast in ICARTT 2004 for Multi-Grid-Box Validation of Satellite Optical Depth Retrievals**

Shinozuka, Y., A. Clarke, V. Kapustin, and S. Howell, **Aerosol profiles and optical depth over North America during INTEX**

Singh, H. B., E. Czech, M. Avery, J. Crawford, G. Sachse, D. Blake, R. Cohen, J. Dibb, G. Huey, D. Jacob, R. Hudman, L. Emmons, L. Horowitz, G. Carmichael, **Reactive Nitrogen Distribution and Budgets in the North American Troposphere and Lowermost Stratosphere**

Singh, H. B., W. Brune, J. Crawford, and D. Jacob, **Overview of the Summer 2004 Intercontinental Chemical Transport Experiment-North America (INTEX-A)**

Tang, Y., G. Carmichael + many, **The influence of lateral and top boundary conditions on regional air quality prediction: a multi-scale study coupling regional and global chemical transport models**

Tarasick, D. W., M. Moran, A. Thompson, T. Carey-Smith, Y. Rochon, V. Bouchet, S. Cousineau, R. Menard, J. Pudykiewicz, O. R. Cooper, S. J. Oltmans, J. C. Witte, G. Forbes, B. J. Johnson, J. Merrill, G. Morris, M. J. Newchurch, F. J. Schmidlin, E. Joseph, **Comparison of Canadian Air Quality Forecast Models With Tropospheric Ozone Profile Measurements Above Mid-Latitude North America During the IONS/ICARTT Campaign: Evidence for Stratospheric Input**

Thompson, A. M., J. B. Stone, J. C. Witte, R. B. Pierce, R. B. Chatfield, S. J. Oltmans, O. R. Cooper, B. F. Taubman, B. J. Johnson, E. Joseph, T. L. Kucsma, J. T. Merrill, G. A. Morris, M. J. Newchurch, F. J. Schmidlin, D. W. Tarasick, V. Thouret, **Stratospheric Contributions to Tropospheric Ozone Profiles in Eastern North America, July-August 2004 (IONS): A Typical “Spring-like Summer?”**

Thompson, A. M., J. B. Stone, J. C. Witte, R. B. Pierce, R. B. Chatfield, S. J. Oltmans, B. J. Johnson, E. Joseph, T. L. Kucsma, J. T. Merrill, G. A. Morris, M. J. Newchurch, F. J. Schmidlin, D. W. Tarasick, V. Thouret, **Tropospheric Ozone Budgets & Variability during IONS-2002 (INTEX Ozonesonde Network Study)**

Thornhill, K.L., B.E. Anderson, G. Chen, E.L. Winstead, A.D. Clarke, Y. Shinozuka, C. McNaughton, J. Dibb, E. Scheuer, C. Jordan, D.R. Blake, G. Sachse, A. Fried, G. Huey, R. Cohen, P. Wennberg, and possibly others, **The Impact of Continental Outflow on Chemical and Aerosol Distributions Off the Northeast U.S. Coast During INTEX-NA**

Turquety, S., D. J. Jacob, J. A. Logan, R. C. Hudman, R. M. Yevich, F. Y. Leung, R. M. Yantosca, C. L. Heald, L. K. Emmons, D. P. Edwards, G. W. Sachse, J. Holloway, P. Novelli, [et al.], **Inventory of boreal fire emissions for North America: importance of peat burning and pyro-convective injection**